An

URBAN DISTRICT OF

SIDMOUTH,

S. DEVON.

Annual Report

OF THE

Medical Officer of Health

1913

SIDMOUTH:

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1914.



TO THE CHAIRMAN AND MEMBERS OF THE SIDMOUTH URBAN DISTRICT COUNCIL.

Gentlemen,

I have the honour to submit my third Annual Report on the health and sanitary circumstances of your district.

In April, 1913, you appointed Mr. A. C. Bird Deputy Medical Officer of Health for six months; consequently much of the present report is founded on his monthly reports and the records of his visits and inspections, for which I am greatly indebted to him.

I wish also to thank the Sanitary Inspector, Mr. E. St. Leger Whitford, for his valuable help in the preparation of this Report, and my other Colleagues in the Council's service, for their co-operation in the work of the Sanitary Department.

I am, Gentlemen,

Yours faithfully,

W. H. PEILE.

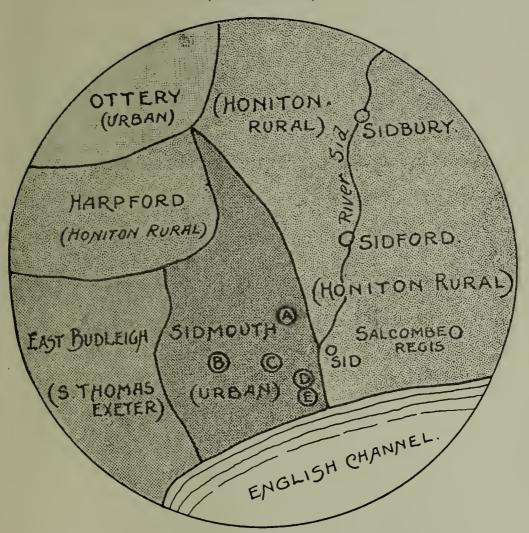
Sidmouth.

March 25th, 1914.

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Sketch Map of the Parishes and Sanitary Areas adjoining Sidmouth Urban District (1606 Acres).



Schools.—A Woolbrook. B Convent. C All Saints'. D Boys'. E Girls.

Note.—For "East Budleigh" read "Otterton."

Latitude 50° 41' N. Longitude 3° 14' 30" W. This Map is reproduced by kind permission of John Tindall, Esq.



ANNUAL REPORT OF THE MEDICAL OFFICER OF HEALTH, 1913.

NATURAL AND SOCIAL CONDITIONS OF THE DISTRICT.

The town of Sidmouth and a portion of the valley in which it lies, comprise the administrative area of the Urban District Council.

Of the total area (1606 acres) a large portion is rural, and the greater part of the population is concentrated on the 260 acres on which the town is built.

The district is bounded by the Rural Districts of Honiton and St. Thomas, Exeter, and the Urban District of Ottery St. Mary; and the adjoining Parishes are Salcombe Regis, Sidbury, Harpford and Otterton. (See map).

The climate is characteristic of the South-West Coast, and the town enjoys some protection from cold winds, a full South aspect, and more than the average amount of sunshine, especially in winter. The prevailing wind in summer is S.W. and the average rainfall for the past 20 years is 31.32 inches. Miss C. M. Radford has kindly allowed me to reprint her meteorological records for the year, and they will be found in Appendix 1.

The soil is a porous marl of the new red sandstone formation lining the entire valley; the proportions of loam and clay vary in different parts and with them the stiffness and porosity of the soil. The bottom of the valley, along the present and former courses of the river, shows extensive beds of gravel overlying the marl, and on Peak and Bulverton Hills are deposits of greensand capped with clay and chertstones.

POPULATION. The population at the census of 1911 was returned at 5,612. This figure however includes 78 men on board a vessel in the bay. 5,534 was therefore the precise resident population at the time. Of these 3,300 were females and

2.234 males. Estimated by the Registrar General's method the central population or population on June 30th, 1913 was 5,875, an increase of 147 in the year.

The method of estimation used assumes that the population is increasing in geometrical progression at the same rate as it did in the intercensal period of 1901-1911, and not by excess of births over deaths.

A large proportion of the inhabitants of the District are employed in the various activities demanded by the visitors, and by the steadily increasing number of private residents who are making Sidmouth their permanent abode. Other industries are brickmaking and the building trade, dairy farming and agriculture, brewing, and inshore fishing.

SANITARY CIRCUMSTANCES OF THE DISTRICT.

WATER SUPPLY. The water supply to the town and district by the Sidmouth Water Company is derived from springs on Peak, Bulverton and Pin Hills. The sources, method of collection, and storage have been fully described in my previous reports and I have nothing further to add on these points. The water is soft, pure and abundant, and a constant service is laid on to 1,156 of the 1,311 houses in the district.

There are still some surface wells in use for the supply of drinking water but these are being gradually abolished in favour of the town supply. Analyses of well-water are made when there is any reason to suspect contamination, and if necessary the wells are closed.

Some of the farms in outlying parts of the district are supplied by private springs whose water is of good quality.

The water supply of the district may be regarded as highly satisfactory. A recent analysis of the water from one of the Company's mains will be found in Appendix II. The softness of the water renders it highly suitable for domestic purposes, and the one fault of a soft water, i.e. its power of dissolving lead pipes is here obviated by the absence of peaty acids and the presence of silica which forms a protective lining in the pipes. I have a piece of lead pipe which for 60 years conveyed water to a house in the town. The bore of the pipe is lined by a

smooth layer of silicates and there is no sign of erosion.

The organic purity of the water is evidenced by the low figures for chlorides, nitrates, and the ammonias, and is due to the uninhabited collecting area, the natural filter beds of greensand, and the careful manner in which the springs are impounded.

RIVERS AND STREAMS. These are the Sid, the Woolbrook, and the Cotmaton brook. There are also springs at Cotmaton which, about the year 1845, supplied the town with excellent water, but are now allowed to run to waste;* none of these water-courses are now used for drinking purposes, and their chief function is to receive stormwater and so relieve the foul sewers. There is no serious pollution of the river or streams, but the time-hon-oured custom of throwing refuse and unsaleable fish etc., into the river Sid has not entirely died out and occasionally requires action on the part of the Sanitary Officers.

Drainage and Sewerage. The sewerage system, dating from 1897, has now to deal with the storm water from many acres of new roofs and roads constructed since that date, and with the sewerage of 351 more houses. The additional volume discharged into the sewers tends to aggravate that tendency to storms—flooding which has been occurring in the basements of certain houses on the low level sewer for many years.

In January some very wet and stormy weather was experienced as will be seen by subjoined table.

TABLE
Showing weather conditions on the dates of flooding.

Date, 191	3.	Rainfall in inches.	Barometer 9 a.m.	Wind.
Jan. 10th Jan. 11th Jan. 27th Jan. 28th		.67 .86 .46	29.84 29.52 30.07 29.79	S.S.E. to S.W. Stiff breeze to half a gale.

As a result of this heavy rainfall the low level

^{*}Climate and Medical Topography of Sidmouth, by J. D. Jeffery, Esq., Surgeon, 1843.

sewer was surcharged, and flooding occurred along the line of the lower level sewer on January 11th and 12th.

On January 11th, Broadway between the Knowle Hotel and the Convent was flooded to a depth of four feet for some hours and was impassable. This happened again on the 28th of January.

Flooding also occurred at the lower end of Winslade Road, and at Temple Street.

In March I made the above facts the subject of a special report to the Council and to the Local Government Board.

In the summer, stormwater sewers were laid in Brewery Lane and Peasland Road; and the valley portion of Broadway was drained into the goyle passing through the Convent grounds so as to carry off a large volume of surface water coming from the Manor Grounds.

These works have no doubt diverted a large amount of stormwater and relieved the foul sewers considerably, but in spite of them, and notwithstanding the absence of any very heavy rainfall on any one day, the flooding nuisance has not been entirely abolished, and the trouble recurred to some extent on May 8th and 12th, October 7th and 9th, and December 29th.

A further extension of the stormwater drainage system is contemplated, and is highly desirable, but it must not be forgotten that the sea is an important factor in the problem in certain states of wind and tide. At high tide when the shingle is high and there is a strong S.W. wind, the waves run up to the sea-wall and break on it; the tops of the waves are blown over the sea wall and Esplanade, and the water runs down to add to the flood on the low ground behind the Esplanade. Some of the occupants are ready for the emergency and always have weather-boards ready to be fitted into grooves and tamped with clay to keep out the flood.

A sudden storm at night will, however, render precautions futile, and damage to property and trade and a considerable nuisance results.

The conclusion of the whole matter is that the

outfall sewer must be relieved somehow; laying stormwater sewers is expensive (£570 is the loan demanded for the next extension), and bearing in mind how a similar difficulty is overcome at Exmouth and at Weymouth one cannot help speculating as to whether it would not be cheaper to put in a pumping station at the Gasworks under which the main sewer passes. It would then be possible to deal with any amount of sewerage and stormwater under all conditions of wind and tide.

Not being an engineer I make this suggestion with much diffidence, but civil engineers and others who have great experience in such matters seem to think that a pumping station would stop the flooding once and for all, and do away with the necessity for further expensive stormwater sewers.

CLOSET ACCOMMODATION. In the Urban portion of the District, where sewers and a constant service of water are available, water closets are in use everywhere. In the Rural portion, earth and asli closets are found, and their number may be estimated at fifty.

Of the houses erected this year two are remote from a sewer and E.C.s have been provided for them. One privy attached to a farm house was found to be highly insanitary, and will be abolished when the house, now empty, is re-occupied. Generally speaking, the sanitary appliances in use are of a good and modern type. A few valve closets are still in use, and in old houses one occasionally finds the old insanitary pan and D-trap closets. These are condemned and removed whenever found, as they are usually an indication that the whole drainage system of the house is dangerous and needs to be remodelled throughout.

As a rule, earth and ash closets are badly kept. The hoppers are empty, the buckets are full, and there is an obvious nuisance, but of course one is told that it has arisen for the first time through exceptional and unavoidable circumstances and shall never recur!

SCAVENGING AND DISPOSAL OF REFUSE. The remarks made on this subject in my previous Annual Reports are, in the main, still applicable. Sanitary dustbins are in the minority and open boxes and buckets are in evidence in many parts of the

town.* These insanitary receptacles are often put out in the open street, and remain imperfectly emptied on the curb when the scavengers have passed. Now that the old fashioned ashpit is no longer part of the equipment of the house, the landlord should be compelled to provide a sanitary dustbin for each new tenant, and the tenant should be compelled to maintain the same or another in serviceable repair throughout his tenancy. A byelaw to this effect is badly needed. Refuse is collected in the central parts of the town daily. Outlying parts where houses are larger and more scattered are visited twice a week. A bi-weekly collection is difficult to arrange in such a manner that there is always a two day, or three day, interval between the days of collection. Collection of refuse from every house on each alternate weekday and the use of small sanitary dustbins would be the ideal state of affairs and might be managed without any great difficulty and expense.

Householders and their servants will not realize that tons of organic refuse—scraps of meat, fat, vegetable parings, bread crusts, etc., which could be easily burnt in the kitchen fire and give out a valuable heat, are now wasted, and add to the labours of the scavengers and the expenses and difficulties of the Council.

The collection and conveyance through the streets of manure and liquid refuse (pigwash) is a recurring nuisance which will, I hope, be controlled by a bye-law in the near future.

DISPOSAL OF REFUSE. Domestic refuse is carted to a field at Woolbrook and there deposited. Old tins and bottles are sorted out, and paper and rags burnt. The organic moiety attracts rats, flies and blue-bottles, and the ground covered ceases finally to be in any way productive or fit for building sites. Primitive man got rid of his refuse in much the same

^{*}The numbers and types of the receptacles used for storing household refuse are as follows:—

Sanitary dustbins with co	overs		• • •	• • •	•••	229
Ditto without covers						6
Insanitary Ashpits						8
Open boxes and buckets	(one	for	each	hou	ıse)	1068

Total (number of houses) ... 1311

fashion and the kitchen middens thus formed are of great value and interest to archæologists.

But such obsolete methods are wasteful as well as insanitary. Household refuse has a high calorific value which by the use of properly constructed furnaces can be converted into power without creating any nuisance. It has been noticed that where destructors have been installed there has been a coincident fall in the attack and death rates of infectious diseases and diarrhoea.

In my report for 1911, I advocated the purchase of a destructor and I think that the time and opportunity are now both ripe for its installation.

Destructors have recently been brought to a state of great efficiency, and no other method of refuse disposal can be regarded as being both economical and sanitary.

The old open manure pits are gradually being replaced by sanitary receptacles. Of these, four more have been built in the year, and no doubt have been the means of preventing nuisance from offensive smells and the breeding of flies.

Sanitary Inspections of the District. Routine inspections have been made as tabulated below:—

		,		
Nature of Premises etc., Visited or Inspected.	No of Visits or Inspec- tions.	Defects, Diseases and Nuisances Discovered.	No.	Action taken and Result.
10 Bakehouses	20	Minor Sanitary Defects	4	Remedied.
13 Cowslieds	30	Defective paving and draining Omission to lime wash at proper time	9	Work done after serving notice on occupiers.
20 Dairies and Milkshops	40	Dirty or imper- fectly cleansed churns & milk- ing vessels.	3	Notice to occupiers followed by personal interview& copy of the Board of Agriculture's leaflet 'Cleanliness in the Dairy.'
7 Slaughter- houses	15	Defective paving Keeping manure and offal so as to be a nuisance	3	Remedied and abated on notice to occupiers.
61 Factories and Workshops		Dirty walls Overcrowding in workshop Dirty floors Omission to lime- wash	I I I	Do.
64 Dwelling Houses	64	See statement under "Hous- ing. Infra.		
Homes of Persons notified under Tuberculosis Regulations	15	See Prevention and Control of Tuberculosis.		
School Absentees	4	Whooping cough Pediculosis Injury	2 I I	Exclusion from School.
Total	188		29	

The Sanitary Inspector has made the following visits and inspections.

Premis	ses, defects or nuisances inspected		No.
1.	Defective House Drains		65
2.	Unventilated Soil Pipes		-22
3.	Defective or Unflushed W.C.s		34
4.	Other (Minor) Sanitary Defects		106
5.	Defective Soil Pipes		48
6.	Yards Unpaved and Damp		-23
7.	Nuisances from Animals		11
8.	Accumulations of Rubbish and M	anure	17
9.	Miscellaneous		57
			383

It is gratifying to note that the above total is 127 less than that of last year.

198 informal notices were served in cases, where verbal intimation had been disregarded, and in no case was a statutory notice required.

917 tests of house drains, new, defective, or repaired were carried out. The smoke test was used in 559 instances and the water test in 358.

PREMISES AND OCCUPATIONS CONTROLLED BY BYE-LAWS. There are Bye-Laws and Regulations relating to:—

1.	New Streets and Buildings	(1895)
2.	Nuisances	(1895)
3.	Slaughter-Houses	(1895)
4.	Dairies, Cowsheds and Milk	
	Shops	(1894)

All these, and more especially 1 and 4 need to be revised and brought up to date.

5. Bakehouses are controlled by the Factory and Workshop Act.

The Premises controlled are:-

Cowsheds			13
Dairies and Milksl	nops		20
Slaughter-Houses	•••	• • •	7
Bakehouses			10

There are no registered common lodging houses or cellar dwellings. The only offensive trade is that of tripe boiling. There is an Inn capable of accommodating 30 persons at a charge of 6d. or 1s. per night. This establishment is wholesome and well managed, and the sanitary accommodation adequate.

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SCHOOLS. There are four Public Elementary Schools in the District, viz:—

2. 3.	Woolbrook (Boys & Girls) All Saints (Girls & Infants) Eastern Town (Boys) Eastern Town (Girls & Infants)	 HOLARS 203 227 118 125	
	TOTAL	 673	

The Eastern Town Boys' School, the Eastern Town Girls' School, and the Infants' Department of the All Saints' School do not in some respects come up to modern requirements, and need improvement. The water supply of all is good, and the sanitary and lavatory accommodation, though insufficient in some cases, is generally of sound construction and is kept in excellent order.

The Head Master and Mistresses send me a weekly return of absentees, and the homes of the latter are visited when required. The schools are also inspected periodically, and in the summer vacation the walls are sprayed with formalin. Disinfection is also carried out at other times should need arise.

More accommodation is required, and the School Authorities are contemplating a re-arrangement of the existing schools and the erection of a new one.

FOOD.

MILK SUPPLY. The condition of the cowsheds has been considerably improved of late years with regard to paving, draining, ventilation and lighting. Three of the dairy farms are, however, still unsatisfactory and badly kept. In January I sent to every Cowkeeper a copy of the Board of Agriculture's leaflet No. 151, which deals in simple language with cleanliness in the dairy and in the process of milking. In some instances a few of the suggestions contained in this leaflet have been acted upon, but generally more reliance is placed on straining milk to get rid of dirt than on measures which prevent dirt from getting into the milk, i.e. grooming and clipping the hind quarters of the cows, washing udders, and making the milkers wash their hands and wear smocks or overalls. Nor is sufficient care always taken in the cleansing and sterilisation of churns and pails. The supply of boiling water is

defective, and on three occasions I have found vessels obviously dirty. Much milk is imported into the district and of the conditions under which this is collected 1 am unable to speak. I know of only one farm where the cows are systematically tested with tuberculin.

The removal of manure from farmyards is a matter of considerable difficulty, and one usually finds that convenience and the demands of the land are studied before the sanitary condition of the farmyard and cowsheds.

Twelve samples of milk were bought in the ordinary way and were tested with the lactometer, cream tube, and with litmus paper. Pure fresh milk from a well-fed healthy cow should have a specific gravity of about 1032, throw at least 10 per cent of cream after standing for 24 hours, and be alkaline to litmus paper. If it is acid (sour) or shows a brown deposit at the bottom of the cream tube one may be sure that the cows or the milkers' hands, or both, were dirty at the time of milking. If the specific gravity is low (1026) it may mean that the sample is very rich in cream, or that water has been added; so that if a sample of low specific gravity casts a lot of cream it is all right; if not, water has been added. Cream is light, and lowers the specific gravity of milk, so if a sample has a high specific gravity (1037) and casts only, say 5 per cent of cream, one may fairly conclude that cream has been abstracted and that the sample is skim milk or something very like it.

Below are the results of my "sorting" tests in tabular form; it will be seen that the sample, No. 12, was obviously skim milk (sold however as pure milk) and the Public Analyst reported that 90 per cent of the cream had been abstracted. Too many of the samples gave that brown sediment which can only mean that the milk was not taken by clean hands from clean udders.

Anyone can, for a few shillings, buy a lactometer, a cream tube, and some litmus paper and do these tests for himself in five minutes.

The dairies in the town are clean and attractive and most of them have a good supply of boiling water for cleansing and sterilising the vessels used; There is a very large export trade in clotted cream and I believe this delicacy is of excellent quality and free from preservatives.

TABLE SHOWING RESULTS OF MILK TESTS.

Reference No. of Sample.	Specific Gravity. (Should be about 1032.)	Perc'ntage of cream by volume (Should be 10 at least).	Reaction to litmus paper. (Should be alkaliue.)	Brown deposit on standing (dirt). (Should be none).	Remarks.
I	1036	8	Alkaline.	Present.	Poor in Cream.
2	1036	10	Acid.	Very heavy.	Dirty.
3	1040	12	Alkaline.	Present.	Good but not clean.
4	1037	18	Alkaline.	Absent.	Good & clean.
5	1026	14	Neutral.	Heavy.	Dirty.
6	1037	10	Alkaline.	Absent.	Good & clea
7	1025	15	Neutral.	,1	**
8	1029	20	Alkaline.	,,	,,
9	1034	25	Alkaline,	Slight.	,,
10	1032	11	Acid.	Heavy.	Dirty.
11	1030	11	Alkaline.	Absent.	Good & clean.
12	1040	.2	Alkaline.	Present.	Skim milk.

OTHER FOODS. There has been no seizure of unsound food, and the inspection of premises where foods are prepared, stored, and exposed for sale has been generally satisfactory. The bakehouses are sanitary and well kept, and none of them is underground.

I have inspected twenty carcases of animals immediately after slaughter, and in no case was there any obvious disease. The slaughterhouses are well managed, and kept clean, but, as I have said before, the situation of six out of the seven is bad, and they should be abolished and replaced by a public slaughterhouse well outside the town.

Housing. Practical measures have this year been taken to supply the urgent need for more working-class dwellings; on September 26th, a Local Government Board Inspector enquired into the Council's application for a loan of £11,300 for the purchase of three acres of land at Woolbrook, and for building 51 cottages thereon.

One of the most striking pieces of evidence given at the enquiry was that of Mr. Howard, Assistant Overseer, who stated that the number of houses assessed at £10 and under had only increased by four, while the population had increased by 1000 in the past 10 years.

This fact is in accordance with the opinion expressed in my last Annual Report, that a large number of working-class families are either housed inadequately, or are paying excessive rents for their cottages.

Evidence was also given to the effect that the average daily wage of a labourer in the district was 3/-; while it took a good mechanic all his time to average 24/- a week. Now a working man with a wife and children cannot possibly pay more than one sixth of his wage in rent and at the same time feed and clothe himself and his family properly. It follows, therefore, that cottages at 3 - and 4/- per week are wanted if the working-classes are to be housed with due regard to the physical fitness of future generations.

The price of land and the recent advance of quite 25 per cent in the cost of building materials make it impossible to build a cottage to let at 3/- or 4/a week except at a loss, but I hope the Council's cottages will be rented at not more than 5/- a week (including rates, and a garden worth at least 6d. a week to a good tenant), and that as a result the rents of existing cottages will fall because the demand will be less; then perhaps the labourer at 18/- a week will be able to get a cottage at 3/a week, and it will be possible to close and demolish some of the worst cottages and build on the valuable sites now occupied by them some really decent working-class dwellings for fishermen and others whose occupations require them to live near the beach or in the town.

The objectors at the Local Government Board enquiry were, for the most part, interested persons, who urged that private enterprise would supply the need, and cited certain houses then being built as cases in point. Experience is, however, all against this contention, and as a matter of fact the houses referred to are now occupied at rents of 5/- to 6/3 per week (the latter mostly) plus rates, so that they cannot in any sense be classed as workingmen's dwellings. I have also heard the astounding

opinion advanced that so long as Sidmouth is prosperous, there **must** be a shortage of cottages, i.e. that the working-man **must** be badly and expensively housed. I trust the next few years will bring with them a practical refutation of this opinion, which seems to me to smack of the dark ages.

Since the enquiry, the site at Woolbrook has been abandoned in favour of one nearer the town; the latter site, though more desirable from the builder's point of view, and more convenient for some of the prospective tenants, is by no means so healthily situated as the one at Woolbrook, and the price of the land is much higher.

One excellent result of the Housing Scheme and of the adoption of the Housing and Town Planning Act, has been the general improvement of cottage property in the district. The smartened appearance of the cottages is obvious, and I am able to state confidently that the improvements are not confined to the exteriors, but that much has been done to make them more comfortable and sanitary within.

Another good result is the downward tendency of the price of land for building, and that the coming powers of the Council under the Housing and Town Planning Scheme have to some extent checked indiscriminate building.

The table of cases of overcrowding given in my report last year would serve equally well for this year. In some cases the families mentioned have moved from one house to another without materially improving their conditions, and it is difficult to see how overcrowding can be prevented in the case of a family of two adults and six or more children occupying two bedrooms—conditions which occur not infrequently.

In 1913, ten new houses were assessed. Of these, nine were of over £8 rateable value, and only two of the ten can be classed as working-men's dwellings.

The assessments of the houses in the district are as follows:—

Over £8 rateable value ... 929 Rateable value £8 and under 382

TOTAL 1311

There is therefore, a shortage of cottages in relation to the growth of the population. Supervision over the construction of new houses is a part of the duties of the Council's Surveyor, and the drainage and sanitary fittings are controlled by the Sanitary Inspector.

Tabular statement under Article V. of the Housing (Inspection of District) Regulations, 1910:—

1.	Number of dwelling-houses inspected under and for the purposes of Section 17 of the Act of 1909	64			
2.	Number of dwelling-houses which on inspection were considered to be in a state so dangerous or injurious to health as to be unfit for habitation	19			
3.	Number of representations made to the local authority with a view to the making of closing orders	2			
4.	Number of closing orders made	2			
5.	The number of dwelling-houses, the defects in which were remedied without the making of closing orders	25			
6.	The number of dwelling-houses which, after the making of closing orders, were put into a fit state for human habitation	1			
Т	ABLE of General Character of defects found to exist :-	_			
Bacl	to Back Houses	17			
Defi	cient surrounding light and air	20			
Dam	pness of walls and ceilings	10			
Dirt	y and verminous houses	15			
Unpaved yards					
Hou	ses with insufficient or defective closet accommodation	17			
Stru	ectural Defects	16			

Housing and Town Planning Act, 1909. Some progress has been made with the scheme under the above, and the area finally decided upon comprises that portion of the Urban district south of the old Roman road passing through Stowford—about 1000 acres in all.

The scheme was advertised on October 22nd, and on November 19th the first of the statutory public meetings was held to ascertain the attitude of persons interested in or affected by the scheme. A map was submitted defining the proposed area and certain excepted "island" portions, together

with tentative proposals as to the number of houses per acre to be allowed in the various parts of the area, and the provision of open spaces.

The attitude of those attending the meeting was friendly, and the opposition slight. Some minor alterations were made at the suggestion of certain landowners affected, and the application for leave to prepare a detailed scheme, together with the necessary maps and exhibits, has now (March, 1914) been forwarded to the Local Government Board.

Our Town Planning Area will be co-terminous on its eastern side with that of the Honiton Rural District Council, and it is highly desirable that the two Authorities concerned should co-operate amicably in an undertaking which will greatly benefit the whole valley.

Workshops and Workshops registered under the Factories and Workshops registered under the Factory Acts. These have been found on inspection to be, for the most part, healthy and conducted with due regard for the welfare of those employed. In 17 instances the Sanitary Inspector has had to call attention to nuisances and defects under the Public Health Acts, and in all cases the necessary work has been done on demand.

Patticulars.	Number of Defects.		
	Found	Remed'd	
Nuisances under the Public Health Acts— Want of Cleanliness Floors undrained Overcrowding Sanitary Accommodation Insufficient Unsuitable or defective Not separate for sexes	3 1 1 5 6 1	3 1 1 5 6	
Total	17	17	

SANITARY ADMINISTRATION OF THE DISTRICT.

- 1. STAFF. Medical Officer (part time), Sanitary Inspector (whole time), and his assistant (part time). The large amount of extra work imposed by recent Acts and Orders of the L. G. B. would justify the employment of a junior clerk to keep the books and registers, and to mind the office in the mornings when the Sanitary Officers are out on their rounds.
- 2. HOSPITAL ACCOMMODATION. None in district. See section on Infectious Diseases.

- 3. LOCAL AND ADOPTIVE ACTS IN FORCE IN THE DISTRICT. Sidmouth Water Act, 1886. Public Health Acts (Amendment) Act 1890, parts 1 and 3. Public Health Acts (Amendment) Act, 1907, sections 34—42 and 44—51. Housing and Town Planning Act, 1909.
- 4. CHEMICAL AND BACTERIOLOGICAL WORK. Two samples of water have been analysed. One of these was unsatisfactory, and the well from which it was drawn is to be closed for drinking purposes. Seventeen specimens were examined bacteriologically; this number includes twelve examinations of material for detection of tubercle bacilli.

PREVALANCE AND CONTROL OF ACUTE INFECTIOUS DISEASE.

Nine cases of infectious diseases were notified, viz.

Diphtheria ... 2
Scarlet Fever ... 4
Erysipelas ... 2
Enteric Fever ... 1

The diphtheria cases were sporadic and had no connection one with another. The first, which was that of a lady visitor at an hotel, was removed home in a private motor car; the second, that of a resident, was nursed at his home, and all the other occupants of the house received protective doses of antitoxin. Both cases were mild, and in the absence of any obvious source of infection, must be attributed to contact with a carrier or person who, though in good health, yet harbours the germ in his throat.

Three of the cases of Scarlet Fever occurred in quick succession on March 22nd, 23rd, and 27th. All three patients were visitors at the same hotel and were probably infected from the same antecedent case, a mild one which was not notified in this district.

One case was sent to Whipton Sanatorium, and two were isolated in private houses in the town. All infected rooms, bedding and clothes were disinfected both at the hotel and at the houses where the patients were isolated, and all possible measures were used successfully for preventing the spread of the disease.

The removal of these two cases to private houses was strongly, and I think, unjustifiably, resented by

neighbours who did their best to create a panic when the town was full of visitors; such persons apparently think only of themselves and of any small risk they may run, and have no confidence in the efficiency of the Sanitary Officers whose work they make more difficult.

The two cases of Erysipelas were of a mild type, and in each case a good recovery resulted.

The case of Enteric (typhoid) Fever occurred in a cottage in Eastern Town. The patient, a boy aged 9, had a very severe attack of the disease and his life was undoubtedly saved by prompt removal in the Council's ambulance to the Whipton Sanatorium, and by the excellent nursing and attention he received while in that Institution. His removal was, moreover, essential to the safety of other inmates of the cottage.

Nine cases of infectious diseases in a population of nearly 6,000 is equivalent to an incidence rate of only about 1.5 per 1,000. This is highly satisfactory when one considers the prevalence of Scarlet Fever all over the country in the latter half of the year, and the fact that people are constantly coming and going between Sidmouth and infected districts.

For the greater part of the year 25 school children travel by train from Sidmouth every day to schools outside the district, returning in the evening, and are liable to infection, or to carry infection back to their homes.

Finally an integral part of Sidmouth east of the river is not under the sanitary control of the U.D.C. who receive no notification of infectious diseases occurring in these parts and have no power over the movements of persons living in infected houses, or over the supply of milk and other goods which may be brought into the town from over the river.

There is no doubt that the present arrangement of the Sanitary Districts is against the best interests of Sidmouth as a health resort. The whole valley as far up as Honiton Common, and including Sidford, Sidbury, and parts of Salcombe Regis should constitute one sanitary area under the control of a single Authority, i.e. the Sidmouth Urban District Council, and should have its own Fever Hospital on a convenient central site. For Sidmouth itself, there should be a small Sanatorium of the Cottage Hospital type, whither visitors suffering from infectious diseases could be removed at once from hotels and lodging houses.

In dealing with such cases, two difficulties present themselves:—

- 1. It is usually impossible to secure proper isolation and nursing at an hotel or lodging house.
- 2. Visitors of the class we get here naturally object to being deported to a public institution 14 miles away and being entirely cut off from their friends.

A local infectious Diseases' Sanatorium would entirely meet these difficulties and make the isolation of sporadic cases of infectious disease an easy matter.

At the recent enquiry with regard to the provision of an Isolation Hospital for East Devon, Sidmouth U.D.C. was the only authority out of six in favour of the scheme,

No doubt such hospital if provided would improve our facilities for isolation in case of an epidemic, but the hospital, if central for the proposed area, would be a long way from the town and the same difficulties which we now experience with regard to Whipton would persist in a minor degree; as there appears to be no immediate prospect of the amalgamation of Sidmouth, Sidford, Sidbury, and Salcombe Regis into one sanitary area with its own hospital, I am in favour of the Joint Isolation Hospital scheme, provided that a small local Sanatorium for infectious diseases is maintained by the U.D.C. in readiness to receive early cases imported by visitors to the town.

The diagnoses of both cases of diphtheria and of the case of enteric fever were confirmed by bacteriological examination.

Swabs from the throats of the diphtheria cases and persons in contact with them were sent for examination, and of these two were positive and five negative.

In every case the milk supply, water supply, and sanitary condition of the house was carefully investigated. A large quantity of milk is daily imported into Sidmouth from farms over which the U.D.C. has no control. I am, however, of the opinion that the diseases alluded to above, were not caused by contaminated milk.

Prevention of and Control over Tuberculosis. The 24 cases notified in 1912, the year when consumption was first made compulsorily notifiable.

have been followed up as far as possible with following results:—

Cured	•••			3
Disease	Arrested or	Quiescent		4
Disease	Chronic or	Worse		1
Left the	District			4
Dead		•••		12
			-	
				24

The known mortality of 50% is probably an understatement, as some of the cases which left the district were in an advanced state of the disease.

In 1913 seven more cases were notified, and one belonging to the district was notified elsewhere: of these, one has returned to work with the disease arrested, five are still undergoing treatment, and two are dead.

Of the eight, one was a visitor and seven were residents in the town and district; one of the latter however undoubtedly contracted the disease elsewhere.

The above statistics of a single and largely preventable disease in a small and otherwise healthy district are sufficiently startling and depressing; they connote years of suffering, invalidity, and an enormous loss of money to the community.

Had any other disease, such as meningitis or diarrhæa, attacked 32 people and killed fourteen in a like period in our district, there would have been a tremendous panic and the holding of a public enquiry followed by a general effort to remove the cause of the plague.

But because consumption is insidious in its onset, chronic in its course, and not so obviously contagious as are some other maladies, it is regarded with an apathy which is the main cause of its prevalence and deadliness.

The Tuberculosis Regulations (1912) are no doubt controlling the disease to some extent but until the public as a whole and individually has been taught the natural history of the disease, and has acquired a practical belief in the best methods of prevention and cure, and until the working classes can get healthier houses at a reasonable rent, so long will consumption continue to be one of the principle causes of sickness and death in the country. High rent means low living for the working man and his family; and semi-starvation is consumption's most powerful ally.

On receipt of primary notifications each patient is visited and the nature of his disease and its danger to others explained, together with the best methods for cure and for the avoidance of contagion. A printed leaflet of rules and precautions is left with the patient and his friends, and in cases of poverty disinfectants and a sputum cup or flask are provided. The sanitary condition of the house is investigated and defects remedied; and where necessary, windows are made to open to their full extent and the importance of keeping them open in all weathers is insisted on.

Subsequent visits are paid as required, and most frequently to persons who are in an advanced and highly infectious state of the disease or who, while improving, are likely to forget that regular and precise routine of life and treatment which is essential to a cure. Cases occurring in houses of a good-class are left to the care of the family doctor who usually reports to me periodically on the progress of the case.

The detection of unrecognised cases in connection with notified cases is provided for by inspection of the other inmates of the house and a close enquiry into their state of health, and by physical examination of the chest should any symptoms be present. The long incubation period of the disease makes it difficult to detect fresh cases as early as one could wish. I know, however, of three cases in which direct infection from previous cases could be traced, and in all of these an early diagnosis and prompt treatment have lead to a favourable result.

The Tuberculosis Officer visits and examines all notified cases, and any members of the patient's family who may have been in close attendance on him, or who show symptoms pointing to infection.

The District Nurse visits all notified cases which require her aid and she is responsible for the physical cleanliness of the patients, and for the precautions to be taken for the disposal of sputum and disinfection of soiled linen and clothes. In the case of a consumptive person in a working-class cottage the daily visit of the Nurse is most valuable both to the patient himself and to those who look after him; they all gradually learn by practical demonstration the best methods for cure and protection from infection. Printed leaflets of instructions are in my experience seldom read and acted upon, and the

doctor's visits to cases of the class are naturally few and far between.

After the death or removal of the consumptive the room or rooms occupied by him are disinfected with formalin vapour with all clothes, bedding, etc. in situ. The latter are removed next day to the steam disinfector.

In most cases the walls are stripped, and they and the ceilings re-papered or whitewashed. The floors and furniture are scrubbed with disinfectants. In fact, it is our object to carry out as thorough a disinfection as in the case of an acute infectious disease.

Three cases have been sent to Sanatoria. Two of them went as insured persons under the National Health Insurance Act; the third, also an insured person was refused Sanatorium Treatment on the grounds of advanced disease. He was, however, sent to the Three Counties Sanatorium, Didworthy, for five months.

There is urgent need of more Sanatorium accommodation for early cases of both sexes, insured or not; and it has yet to be recognised that Sanatorium treatment per se is no specific even for early cases; these would probably get well naturally under rational treatment in a healthy home.

Treatment at a Sanatorium should be available for all recoverable cases, and in addition to open air treatment should comprise all the latest methods of diagnosis and treatment, surgical as well as medical, and, perhaps most important of all, a system for following up and taking care of arrested cases who among the working classes at any rate, relapse more often than not.

Failing this, much of the time and money spent in and on Sanatoria is and will be wasted.

OTHER DISEASES. No other disease was unduly prevalent, and no death was recorded from the principle zymotic diseases except influenza, (one), or from diarrhœa and enteritis. The commonest fatal diseases were those to which elderly persons are specially liable.

Venereal disease is not common. Some doctors whom I have asked tell me they had two or three cases each to treat in the course of the year. Others had not seen a case. There is evidence of about

12 cases in the year, (mostly gonorrhoea), but in a small place like this such diseases are concealed and sufferers may go elsewhere for treatment.

Mortality in Childbirth and Infancy. The Midwives' Act, 1902, is now administered by the County Council, and Medical Officers of Health no longer inspect and report on Midwives. 73 births were registered during the year. Of these, 71 were legitimate, and 2 illegitimate. There were 3 deaths of infants under one year of age. These 3 children were all legitimate. In two cases the cause of death was convulsions, and in one, malformation.

The Infant Mortality therefore works out at 41 per 1000 live births. The corresponding figure for the whole of England and Wales was 109, and for Rural districts 96.

No case of puerperal fever was notified this year, and I did not hear of any case of ophthalmia neonatorum. The latter disease will become compulsorily notifiable on April 1st, 1914.

The Notification of Births Act is not in force, and there is no Health Visitor, but the District Nurse does much useful work in this respect.

Forty-one successful primary vaccinations were performed, so that only 56 per cent of the children born are protected against small-pox. This is 20 per cent less than last year. It will need a wide-spread epidemic of small-pox to knock sense into the heads of anti-vaccinators and conscientious objectors, and if they only, and not their helpless children, could be the victims, such an epidemic would afford a useful and salutory object lesson.

VITAL STATISTICS. There was a further decline in the birth-rate to 12.4 per 1000, i.e. not much more than half that for England and Wales (23.9). The death-rate, (9.7 crude, 8.3 standardised) was the lowest ever recorded for the district.

There were no deaths of persons between the ages of 2 and 25, and more than half the deaths recorded were those of persons of 65 years of age and upwards. These facts, in conjunction with the low rate of infant mortality, are highly satisfactory and indicate the natural healthiness of the district, and a due regard for sanitary precautions.

In conclusion, I wish to thank the Council for the attention they have given to my suggestions, and for their support in the discharge of my duties. In the coming year the following matters should be further considered and brought to a practical issue.

- (1). The proposed scheme under the Housing and Town Planning Act, 1909.
 - (2). The Housing Scheme.
- (3). Improved facilities for the isolation of cases of infectious disease. It has been very aptly remarked that Sidmouth lacks what every good boarding-school possesses, viz., that valuable adjunct a sanatorium for infectious diseases. People come here for health just as boys go to school for learning, and there should be provision for those who fall sick of an infectious disease among us. A small detached house or cottage with four rooms would suffice. Hither, any case from an hotel or lodging-house could be promptly removed to be nursed under the care of a local medical man. Visitors would gladly pay for such accommodation, which, if always available for an early or sporadic case, might be the means of arresting a serious epidemic.

As stated above, the County Council has under consideration a scheme for the formation of a Joint Hospital Area for East Devon.

- (4). Extension of stormwater sewers, and measures for the prevention of smells arising from the foul sewers. The latter nuisance, which in hot weather is a very unpleasant one and likely to damage the reputation of the place, might, I believe, be entirely obviated by closing all the existing open road-vents, and putting all the six automatic flushtanks into working order. Adequate ventilation of the sewers could be maintained by means of the existing six-inch standard vent-pipes if repaired, and by the judicious addition of extra vent-pipes at all dead ends and highest points of sewers. I am preparing a scheme for the above work which I think could be carried out at a reasonable cost by the Surveyor, and without calling in a consulting engineer.
 - (5). The Refuse Destructor.
- (6). Revision and enforcement of Bye-laws.—All the Bye-laws now in force are about twenty years old and should be amended so as to conform with modern ideas and progress. The building bye-laws especially need revision; they are in some

cases much too Urban and impose needless and expensive restrictions, while others, such as No. 9, have hitherto been evaded. Bye-law No. 9 enjoins that the whole site or ground surface of a new dwelling-house shall be covered with solid asphalte or cement concrete, six inches thick—a very wise precaution against the aspiration of ground air and moisture, and noxious gases into the house, which otherwise is bound to occur.

By a recent resolution of the Council, this Byelaw should be enforced as from January 1st, 1914, and the sites of the proposed workmen's dwellings will be concreted.

Bye-law 66, which orders soil-pipes to be fixed outside houses has, for the sake of appearance, been disobeyed even of late years. The point of it is that an outside soil-pipe can hurt no one, and is accessible for inspection and repair; a soil-pipe within a house is boxed in or concealed in some way and may leak or discharge drain gases injurious to the health of the inhabitants.

On the other hand, the Bye-laws with respect to the width and construction of new streets are much too rigid for a semi-rural district like Sidmouth, and Bye-law 13, which prohibits the projection of upper stories beyond the foundations, was probably framed to apply only to new houses in the narrow streets of big cities.

Bye-law 26, re party walls, involves an outlay quite disproportionate to the structural and sanitary advantages obtained. This bye-law is to be modified.

In former years I believe a certificate of fitness for habitation was required before a new house was permitted to be occupied. The certificate was granted after the house had been inspected and passed by the Surveyor, and I think it would be an excellent thing if this proceedure could be revived.

The Bye-laws relating to Nuisances, and the Dairies, Cowsheds and Milkshops Regulations also need revision.

(7). Public Lavatories.—The accommodation in this respect (two closets and two urinals) is wholly inadequate. For females there is no provision whatsoever. In the summer months crowds of visitors—

mostly women and children—come down from the lodging houses up on Landpart to spend the day on the front. For their use a public lavatory is badly needed, and if anyone doubts it, let him ask the proprietors of hotels, refreshment-rooms, and shops on and near the front.

The scheme for a sunk lavatory on the three cornered plot, for which admirable plans were made last year, seems to have been entirely dropped. A lavatory and cloakroom of the pavilion type on the Esplanade itself, should be provided for the convenience of our visitors and need offend no one.

(8). The Eastern end of the Esplanade, owing to its dilapidated and unfinished condition, is still regarded by some as a convenient spot for shooting household and garden refuse. This nuisance is not so bad as it used to be, but continues to attract unfavourable comment. If the sea-wall and roadway were neatly rounded off at this point, there would be no need or excuse for depositing builder's or other refuse thereon.

W. H. PEILE, M.A., M.D., D.P.H.,

Medical Officer of Health.

SANITARY INSPECTOR'S REPORT For 1913.

Gentlemen,

I have the honour to make the following brief report of work done by me during the year.

The following is a summary of work carried out under preliminary and verbal notices:—

Preliminary notices served		198
Bell traps and other defective gullies remo	ved	36
New house drains constructed		17
Defective drains repaired	• • •	24
House drains re-constructed		41
Extra W.C.'s built and fitted with flush	ing	
cisterns		18
New W.C.'s with flushing cisterns provide	ded	19
Defective W.C. pans replaced		47
Automatic flushing cisterns connected to W	.C.'s	33
Flushing cisterns repaired		20
Offensive accumulations removed		13
Nuisances from improper keeping of Anim	nals	
abated		7
Cases of overcrowding noted		10
Premises cleansed		12
Defective guttering and down pipes repaire	ed	9
Proper water supplies provided to houses		2
New sinks provided		39
Sink waste pipes renewed or disconnected		21
Defective paving to back yards renewed		-15

NUISANCES GENERALLY.

The number of nuisances dealt with compares favourably with last year.

The nuisances which most frequently needed attention were from choked drains, interceptors, and manure pits; of the latter 4 more have been built in accordance with the Council's Bye-law during the year. Complaints have also been made of keeping animals, including fowls, so as to be a nuisance; fowl runs in small yards are numerous and unless the run is asphalted or covered a nuisance is bound to arise; a bye-law is needed to control the keeping of cocks and hens close to dwelling houses.

The removal of pig-wash and manure through the streets at busy times of the day is still carried on and is a frequent cause of offence, and I have had many complaints about it. All the pig-wash tubs now have covers, but the manure is removed in open carts, from which portions of manure drop off after the roads have been swept. It would be a great advantage to the town if the cartage of manure was forbidden after 10 a.m.

Domestic Refuse.—Sanitary dust-bins are greatly needed; open boxes are used for domestic refuse, and the contents are often spilled on the footpaths. This is due to the carelessness of the householders in not providing even a strong and sound box for the storage of their refuse. Dirty refuse boxes are also left on the pavement for a considerable time after they have been emptied. This insanitary practice is noticed by our visitors, and householders would be acting in their own interests if they would buy sanitary dust-bins and use them.

DRAINAGE WORK.—My time has been largely occupied in supervising the construction of new drains, and in testing the drains of old houses; which in many instances have had to be reconstructed throughout.

In connection with this work I have made 559 smoke tests, and 358 water tests.

I am glad to report that the sanitary work done during the year and the materials used were of excellent quality.

Drainage work, especially the relaying of defective drains of old houses, has taken up an undue amount of my time, but I hope that before long the need for this class of work will be less urgent and that I shall have more time for other matters.

In 23 instances the drainage of large and important houses or premises was remodelled throughout.

FOOD.—In company with the Medical Officer of Health I have inspected the slaughterhouses, bake-houses and other premises in which food is stored or prepared for sale, and certain minor defects have been rectified on demand.

In two cases, nuisances in connection with slaughterhouses have been abated; in one slaughterhouse extensive improvements in paving and drainage have been made. The position of the slaughterhouses in relation to dwelling houses is most undesirable.

Twelve samples of milk were taken during the year, and the results of the tests are given in the Medical Officer of Health's report.

There has been no need to seize unsound or unwholesome articles of food during the year. Twenty carcases have been inspected and found to be free from disease.

INFECTIOUS DISEASES.—Nine cases of notifiable infectious diseases were dealt with during the year. Two cases were removed to Hospital. The new ambulance was most useful and enabled me to remove the patient quickly and without exciting notice.

In one case a patient was on the way to Hospital within an hour of the receipt of the notification.

The remaining seven cases were treated at home, and every precaution was taken to prevent the infection spreading.

The Council's Steam Disinfector has been used 25 times and is in excellent working order, but the fact of having to raise the steam for each disinfection makes the process a rather lengthy one.

An excellent coach-house for the Ambulance has been erected at the Council's yard, and also serves as a store for disinfectants of all kinds.

Twelve Tuberculosis cases have been dealt with during the year.

Disinfection of rooms and bedding used by consumptives has been carried out as thoroughly as in the case of infectious disease.

Rooms occupied by consumptives at lodging houses are also disinfected when notice is given, but in some cases the disease has not been notified in the district, and we do not hear of it until after the patient has left.

Bedding and clothes from non-notifiable cases occurring in private houses and public institutions has also been dealt with on request.

HOUSING.—Sixty-four more houses have been inspected during the year, which brings the total already inspected and re-inspected up to 157.

Details of the inspections are made on the spot, and are copied into a House Inspection Register kept at the Office. Many houses are still awaiting

inspection and I hope to deal with them in the near future. All structural and sanitary defects met with have been remedied as far as possible. Three houses were closed as unfit for habitation. Of these, two were closed by the Council, and one voluntarily by the owner. One remains closed, and two have been re-occupied on the completion of the necessary repairs.

The number of back to back houses is 17, and these houses are of course undesirable from a health point of view. There are also quite a dozen other cottages which are not in all respects reasonably fit for habitation, but it is impossible to close them owing to the shortage of cottages. A table showing the nature of defects discovered is given on page 19 of the Medical Officer of Health's report.

I am, Gentlemen,

Yours Faithfully,

E. ST. LEGER WHITFORD,

Member of the Royal Sanitary Institute. Sanitary and Housing Inspector.

APPENDIX I.

CLIMATE OF SIDMOUTH, 1913.

Hours of Bright S	Sunshine				1573
Highest Temperature	in the Air,	Aug. 1st			77.1
Lowest Temperature,	Dec. 31st			•••	27.3
Highest in the Sun, A	Aug. 11th	•••	***		131
Lowest on the Grass,	Dec. 31st		•••		16.4
(Black B	ulb Thermo	meter in	Vacuo).		
Mean of Daily Maxim	na	•••			57.2
Mean of Daily Minim	ıa	***	•••		-15.3
Mean of the Year		***	•••		51.3
Mean 9 a.m	•••				52.

The Thermometers verified at Kew. The maximum and minimum thermometers are hung in a Kew stand—completely protected from sun and sky and freely exposed to the air. Rain received in a 5-inch gauge 1 foot above

			.,				
the	ground		•••	•••	•••	-35.86	inches
The heav	iest fall in	one day,	Jan.	4th		1.34	inches
Number	of days	on which	Rain	fell	•••		185
Mean Hi	unidity of	the air	at 9	a.m.			82.4

The average rainfall for the last 20 years is 31.32, having been raised nearly an inch by the extraordinary fall of last year. The fall this year has again been very great and exceeds the present average by $4\frac{1}{2}$ inches. January with 8.69 was the wettest we ever registered. The other months above the average were March. April, May (the first half was very wet), September, and November. From May 15 to August 25 was a dry period, and only $1\frac{1}{4}$ inches fell. October, November, and most of December were mild, and many summer flowers were still in bloom at Christmas. The sunshine was deficient, being just 160 hours below the average, and only 11 hours better than last year, which had almost the smallest amount recorded, but there were bright intervals on most days, and only 16 sunless. The mean temperature was 1 degree above the average.

APPENDIX II.

Sample taken from one of the Sidmouth Water Company's mains, November 1913, analysed by Mr. Thomas Tickle, F.I.C., B.Sc. Analyst to the Corporation of the City of Exeter.

ANALYSIS.

(Stated as parts per	100,000).		
Total Solid Constituents			9.8
Behaviour of Solid Constituents of	n ignition	trace o	f organic
		matter	charred
Loss of Solid Constituents on	ignition	•••	0.8
Chlorine present as Chlorides		•••	2.8
Nitrogen present as Nitrites		•••	0
Nitrogen present as Nitrates	•••		0.178
Phosphates			0
Total Hardness (in terms equiva	lent to Cale	cium	
Carbonate)	• • • •		2.1
Temporary Hardness (dimished	by boiling)	1.2
Permanent Hardness (after boiling	g)		0.9
Saline Ammonia	•		0
Albuminoid Ammonia			0.0010
Oxygen Absorbed in 4 hours at 8	0 degrees I	·	0.005
Oxygen Absorbed Immediately	•••		0
Poisonous Metals		•••	0

APPENDIX III.

THE SIDMOUTH BATHS.

The tonic effect of sea water baths is well known, and of late years they have been more and more prescribed in the treatment of disease and during convalescence, but in this country open-air sea bathing is, for most people, practicable in the summer only.

At the Sidmouth Baths there is a plunge bath in which sea bathing can be comfortably enjoyed all the year around. Fresh sea water is pumped in daily, and in winter the temperature of the bath is artificially raised to 70° F.

In the well-appointed private bath-rooms sea water is also used for curative purposes, and the hot salt-water Aix-massage bath and the effervescent Nauheim bath can be obtained in greater perfection than at any other south-coast watering place.

All other recognised forms of medical baths combined with massage and passive movements are available at this establishment, which deserves a far wider recognition and support than it it now enjoys.

I regard it as a most valuable adjunct to the attractions of the place as a health-resort, and it is to be hoped that as the knowledge of the uses and value of hydrotherapy spreads among the medical profession and laity, the baths will be more extensively known and patronised by visitors and residents alike.

Vital Statistics of whole District during 1913 and previous Years. TABLE I.

1				
NG TO	Ages.	Rate.	13	11.2 12.1 12.0 10.2 12.0
BELONGI STRICT.	At all Ages.	Number,	12	\$56 601 609 609 57
NETT DEATHS BELONGING TO THE DISTRICT.	řr. of Age	Rate per 1000 nett Births.	11	46.5 47.6 95. 68.
NETT	of Non-Of Resi- Under 1 Yr. of Age	Rate per Number, 1000 nett Number, Births.	Io	44~NN W
TRANSFERABLE DEATHS.	Of Resi-	esidents dentsnot regist'r'd regist'r'd in the in the District. District	6	wr w
TRANSF	of Non-	residents regist'r'd in the District.	8	41 1
DEATHS	STRICT.	Rate	7	11.4 12.3 15.6 10.4 10.2
Total Deaths Registered in the District. Number. Rate		9	57 62 80 58 69 69	
	Nett.	Rate.	5	17.2 16.6 14.5 14. 12.7
Віктнѕ.	N	rected Number. Number	4	78 73
	11,000	rected Number.	3	86 84 74 76 71
Popu-	lation estim't'd	middle of each year.	2	\$000 \$030 \$100 \$569 \$728
	Vevn	1EAR	1	1908 1909 1910 1911 1912

At Census, 1911-- Total Population at all ages 5612.*

Number of inhabited houses 1268.

Average number of persons per house 4.4.

Area of District in acres (land and inland water), 1606.

Estimated Population, 1913, 5875. Number of Inhabited Houses, 1311.

Note.—The death-rate (9.7) is the actual or crude death-rate. The standardised death-rate is 8.3 i.e., the death-rate which would have been recorded if the age and sex constitution of the population of the district had been identical with that of England and Wales as enumerated in 1901. Average Number of Persons per house, 4.4.

TABLE III. Causes of, and Ages at Death, during the Year 1913.

Fotal deaths whether of Residents or 'Non-	residents'in institutions in the District.	=	į	-	-
					_
NTS"	165 an np- ward	01		- 6441 4 67	29
E DIST	45 and under 65 yrs	6		- 62 6 6	13
s of " b	25 and under 45 yrs.	8		4	10
ED AGES	15 and under 25 yrs.	7			
HIJOINE	5 and 15 and 25 and 45 and 65 and under under under under up-15 yrs. 25 yrs. 45 yrs. 65 yrs. wards.	9			
THE SU	t and 2 and 5 and 15 and 25 and 45 and 65 and under under under under up-2 years 5 yrs. 15 yrs. 25 yrs. 45 yrs. 65 yrs. wards.	5			
THS AT	under zyears	4			6
NET'T DEATHS AT THE SUBJOINED AGES OF "RESIDENTS" WHETHER OCCURRING WITHIN OR WITHOUT THE DISTRICT,	All Under un	3		- 0	m
NET	ALL AGES.	7	57	- 4 4 0 10 4 - 0 - 8 8 - 4 0	57
CAUSES OF DEATH			All causes { Certified	Influenza Phthisis (Pulmonary Tuberculosis) Cancer, malignant disease Organic Heart Disease Bronchitis Pheumonia (all forms) Other diseases of respiratory organs Diarrhosa and Enteritis Cirrhosis of Liver Nephritis & Bright's Disease Congenital Debility and Malformation, including Premature Birth Violent Deaths, including suicide Other Defined Diseases Diseases ill-defined or unknown	Totals

